

**Quality and Productivity Commission**  
**34<sup>th</sup> Annual Productivity and Quality Awards Program**  
**"Leading with Excellence"**

**2021 APPLICATION**

Title of Project (Limited to 50 characters, including spaces, using Arial 12-point font):

**NAME OF PROJECT: PREPARATION OF A NEW COVID-19 OUTBREAK WORKFORCE**

**DATE OF IMPLEMENTATION/ADOPTION:** JULY 7, 2020 (START OF TRAINING COHORT 1)

(Must have been fully implemented for a minimum of at least one year - on or before July 1, 2020)

**CHECK HERE IF THIS PROJECT IS BEING SUBMITTED FOR THE COVID-19 IMPACT AWARD ONLY.** (Projects must be implemented on or before December 31, 2020. **Note:** Projects implemented less than one year ago will not be eligible for any other PQA awards. In addition, once a project is submitted, you cannot submit the same project for awards consideration in subsequent years).

**PROJECT STATUS:**  X  Ongoing   One-time only

**HAS YOUR DEPARTMENT PREVIOUSLY SUBMITTED THIS PROJECT?**   Yes  X  No

**EXECUTIVE SUMMARY:**

1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15

In response to the COVID-19 pandemic and the immediate need for a large COVID-19 outbreak workforce, LA County Department of Public Health's Nursing Administration Team planned, developed, and implemented the COVID-19 Outbreak Management Training Program. This original program aimed to equip new clinical and non-clinical staff with the necessary knowledge, skills, and resources to investigate and manage COVID-19 outbreaks in various settings (i.e., education settings, skilled nursing facilities, worksites, places of worship). Delivered on a virtual platform, the COVID-19 Outbreak Management Training Program facilitated training of large cohorts every two weeks while supporting the county's physical distancing guidelines, reduced the county's carbon footprint, and led to an estimated cost avoidance of **\$52,471** and an estimated annual cost savings of **\$347,746**. It prepared new staff to successfully respond to and manage over 5,000 COVID-19 outbreaks, including 1,089 in skilled nursing facilities, 1,734 in worksite, and 260 in education settings resulting in the protection of vulnerable populations and mitigation of COVID-19 across various sectors, hospitalizations, and loss of life within our community.

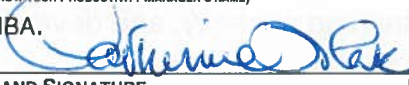
**BENEFITS TO THE COUNTY**


(1) ACTUAL/ESTIMATED ANNUAL COST AVOIDANCE	(2) ACTUAL/ESTIMATED ANNUAL COST SAVINGS	(3) ACTUAL/ESTIMATED ANNUAL REVENUE	(1) + (2) + (3) = TOTAL ANNUAL ACTUAL/ESTIMATED BENEFIT	SERVICE ENHANCEMENT PROJECT
\$ 52,471.00	\$ 347,746.00	\$ 0	\$ 400,217.00	<input type="checkbox"/>

ANNUAL = 12 MONTHS ONLY

<b>SUBMITTING DEPARTMENT NAME AND COMPLETE ADDRESS</b> Nursing Administration 241 N. Figueroa, Room 347, LA, CA 90012	<b>TELEPHONE NUMBER</b> 213-288-7725
--	---

<b>PROGRAM MANAGER'S NAME</b> Dr. Lucille Rayford Nursing Administration EMAIL: lrayford@ph.lacounty.gov	<b>TELEPHONE NUMBER</b> 213-288-7197
---	---

<b>PRODUCTIVITY MANAGER'S NAME AND SIGNATURE</b> (PLEASE CALL (213) 893-0322 YOU DO NOT KNOW YOUR PRODUCTIVITY MANAGER'S NAME) Catherine Mak, MBA. 	<b>DATE</b> 6/25/21	<b>TELEPHONE NUMBER</b> (213) 288-7240
---	------------------------	---

<b>DEPARTMENT HEAD'S NAME AND SIGNATURE</b> BARBARA FERRER, MPH, MED, PHD 	<b>DATE</b> 06/25/21	<b>TELEPHONE NUMBER</b> (213) 288-8117
---	-------------------------	---

**\*\*ELECTRONIC, WET, OR SCANNED SIGNATURES ARE ACCEPTABLE\*\***

**Quality and Productivity Commission**  
**34<sup>th</sup> Annual Productivity and Quality Awards Program**  
**“Leading with Excellence”**

**2021 APPLICATION**

Title of Project (Limited to 50 characters, including spaces, using Arial 12-point font):

**NAME OF PROJECT: PREPARATION OF A NEW COVID-19 OUTBREAK  
WORKFORCE**

**1<sup>st</sup> FACT SHEET – LIMITED UP TO 3 PAGES ONLY:**

**Challenges**

Less than two months after the first case of COVID-19 was confirmed, the World Health Organization declared COVID-19 a pandemic. Key public health activities needed to be implemented immediately to protect our community. Outbreak investigation is a core disease control measure and is a key strategy for preventing further spread of COVID-19. Given the exponential growth in case volume and outbreaks, we needed to make changes in the workforce staffing in preparation for the surge. To prepare a new COVID-19 outbreak investigation workforce, the LA County Department of Public Health’s Nursing Administration (NADM) Team rapidly put together a COVID-19 Outbreak Management Training Program and developed a set of COVID-19 specific outbreak protocols. Developed in mid-June 2020 and implemented in early July 2020, the main goal of this project was to equip new clinical and non-clinical staff with the knowledge and skills to investigate and manage COVID-19 outbreaks in different settings (i.e., education setting, worksites, SNFs). Challenges faced early on included:

- novelty of COVID-19
- need of a huge workforce trained in outbreak investigation and infection control
- critical need for quick planning, development, and implementation of a brand-new outbreak management training program
- develop outbreak investigation protocols for different settings (i.e., SNFs, schools, worksites, persons experiencing homelessness [PEH])
- significant increase in workload on an already busy DPH staff
- develop a virtual training program that would be engaging and creative
- ensure a smooth transition from general training to role-specific training for new staff
- onboard a new cohort every two (2) weeks while maintaining current work assignments and projects
- technical issues that naturally come with virtual training

**Solutions**

Outbreak investigation is a skill that requires comprehensive training to be done effectively. To make a significant impact in the fight against COVID-19, we had to immediately work on scaling up and training a large workforce, the majority of whom were new to the field. With no COVID-19 specific training materials and protocols available to utilize, NADM had to develop new COVID-19 specific training educational materials and protocols, increase our training capacity, and devise new teaching approaches to align with social distancing requirements.

Quality and Productivity Commission  
**34<sup>th</sup> Annual Productivity and Quality Awards Program**  
*“Leading with Excellence”*

**2021 APPLICATION**

Title of Project (Limited to 50 characters, including spaces, using Arial 12-point font):

**NAME OF PROJECT: PREPARATION OF A NEW COVID-19 OUTBREAK WORKFORCE**

A literature review was conducted and search for best practice guidance on other droplet diseases to develop COVID-19 outbreak investigation protocols and training materials. Specific documents were developed for different settings (i.e., SNFs, PEH, schools, etc.) since each setting had different needs and different infection control practices.

In addition, addressing the critical need for quick planning, development, and implementation of a brand-new outbreak management training program and the significant increase in workload on NADM staff involved flexibility and effective collaboration and communication with internal partners, like Acute Communicable Disease Control (ACDC), Health Facilities Inspection Division (HFID) and Environmental Health Services (EHS), and external partners.

To develop a virtual training that fostered creativity, active engagement, and a welcoming environment for both clinical and non-clinical staff, several solutions were implemented. We used a variety of modalities, including live webinar, recorded webinar, and self-paced eLearning courses. Videos and graphics were embedded in several of the recorded and live webinars. In addition, ice breakers and knowledge check questions were integrated throughout the training and time for Q & A was allocated before and after every training presentation. Every first day of training NADM leadership and/or program coordinators offered a warm welcome to all trainees and emphasized the importance of their role (clinical or non-clinical) in LA County’s response to the COVID-19 pandemic. Program coordinators also offered availability via phone call, email, and MS Teams for questions or concerns arising outside of live training hours. In addition, because the training program was virtual, it saved on mileage reimbursement, room reservation fees, printing materials, and decreased our carbon footprint. This resulted in an estimated **cost avoidance of \$52,471**. Also, because the training was virtual, we were able to have large cohort sizes so we could train more people in a shorter amount of time. If we had conducted the training in person, we would be limited by room size and would have required more staff to conduct more trainings for a smaller cohort size. This resulted in an **estimated cost savings of \$347,746**.

Beginning July 7<sup>th</sup>, 2020, a new cohort was trained every two weeks, with a total of **19 cohorts trained so far**. The total number of staff (clinical and non-clinical) who participated in the COVID-19 Outbreak Management Training Program was **441**. The 441 staff were comprised of **124 Nurses, 70 Public Health Investigators, 144 Data Monitors, 87 Clerical Support, 15 Community Workers and 1 Physician**. The training program provided attendees a systematic approach to outbreak response, by providing understanding characteristics of various settings and its population, as well as the infection mitigation strategies for each setting.

**Quality and Productivity Commission**  
**34<sup>th</sup> Annual Productivity and Quality Awards Program**  
**“Leading with Excellence”**

**2021 APPLICATION**

Title of Project (Limited to 50 characters, including spaces, using Arial 12-point font):

**NAME OF PROJECT: PREPARATION OF A NEW COVID-19 OUTBREAK  
WORKFORCE**

**Linkage to the County Strategic Plan – 1 page only.**

**Benefits**

The Outbreak Management Training Program helped meet several of the Board of Supervisor’s Goals in their Strategic Plan.

- Goal 1: World Class Workforce Development
  - Objective 1.1: Training Program
  - Objective 1.5: Workforce and Succession Planning Program

Outbreak investigations and implementing infection control measures rapidly is critical to protect those in the facility as well as the community in general from further spread. If facilities are unable to effectively implement these measures, like cohorting, rapid spread is inevitable resulting in more illness and leading to hospitalization in some cases and occasionally death in the most severe cases.

This outbreak investigation was especially vital in long-term care facilities that housed our most vulnerable population, like Skilled Nursing Facilities (SNF). Elderly SNF residents have multiple chronic diseases and functional impairments that predispose them to infection. In addition, the communal nature of SNF put those living there at increased risk of infection and severe illness from COVID-19.

At the peak of the pandemic, we had more than 15,00 new cases diagnosed each day, our hospitals were under enormous strain and we were losing 277 residents a day. Our newly trained outbreak investigators managed over 5,600 outbreaks, with 25% being in long-term care facilities and 15% in PEH. They assisted facilities in identifying all cases and contacts associated with the outbreak, issued health officer orders, and provided much needed guidance and support.

The work NADM put into recruiting staff, onboarding, and training in record time to handle the COVID-19 surge was a success. We are now seeing significant improvement; averaging less than 200 new cases each day and our daily numbers of death are in the single digit. A substantial contributing factor to this measure is the work of these trained outbreak investigators. They helped to mitigate disease, hospitalization, and death. Achieving our goals required us to innovate quickly, communicate effectively, and adapt readily to address the emerging challenges. These strategies are now the foundation for surge workplace staffing plans for public health emergencies in the years to come. This outcome is priceless.

**Quality and Productivity Commission**  
**34<sup>th</sup> Annual Productivity and Quality Awards Program**  
*"Leading with Excellence"*

**2021 APPLICATION**

Title of Project (Limited to 50 characters, including spaces, using Arial 12-point font):

**NAME OF PROJECT: PREPARATION OF A NEW COVID-19 OUTBREAK WORKFORCE**

**COST AVOIDANCE, COST SAVINGS, AND REVENUE GENERATED (ESTIMATED BENEFITS TO THE COUNTY):** If you are claiming cost benefits, include a calculation on this page. Please indicate whether these benefits apply in total or on a per unit basis, e.g., per capita, per transaction, per case, etc. You must include an explanation of the County cost savings, cost avoidance or new revenue that matches the numbers in the box. Remember to keep your supporting documentation. Use Arial 12-point font

**Cost Avoidance:** Costs that are eliminated or not incurred as a result of program outcomes. Please indicate whether these are costs to the County or to other entities.

**Cost Savings:** A reduction or lessening of expenditures as a result of program outcomes. Please indicate whether these were expenditures by the County or by other entities.

**Revenue:** Increases in existing revenue streams or new revenue sources to the County as a result of program outcomes.

(1) ACTUAL/ESTIMATED ANNUAL COST AVOIDANCE	(2) ACTUAL/ESTIMATED ANNUAL COST SAVINGS	(3) ACTUAL/ESTIMATED ANNUAL REVENUE	(1) + (2) + (3) TOTAL ANNUAL ACTUAL/ESTIMATED BENEFIT	SERVICE ENHANCEMENT PROJECT
\$ 52,471.00	\$347,746.00	\$ 0	\$ 400,217.00	<input type="checkbox"/>

**ANNUAL = 12 MONTHS ONLY**

Estimated Cost avoidance: **\$52,471.00** (Materials and resources)

- Printed handouts 50/colored pages/day for 9 days for 441 students. Each page is \$0.05
- Mileage for travel to training site @ \$.053 mileage 20 miles/day for 9 days for 441 students and 5 trainers

$$= [50 \times 9 \times 441 \times \$0.05] + [20 \times 9 \times 446 \times \$0.53] +$$

$$= \$9,922.50 + \$42,548.40$$

$$= \$52,470.90$$

Estimated Annual Cost Savings: **\$ 347,746.00** (Training staff x5)

- PHN Average Salary is \$50.84 per hour, they trained for 8 hours per day for 9 days for each cohort x 19 cohorts

$$= \$50.84 \times 8 \times 9 \times 5 \times 19$$

$$= \$347,746.00$$